

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently Amended) An image capturing device, comprising:
an electronic image sensor;
a lens for focusing an image on the electronic image sensor, the lens being positioned in a restroom having a door and a sink;
memory for storing at least one digital image frame, image processing code for identifying objects in said digital image frame, and an object-to-event mapping table having a plurality of entries, wherein an entry of said object-to-event mapping table maps a ~~door~~ opensink use event to a particular object; and
a processor in communication with said electronic image sensor and said memory, said processor for determining ~~whether said door has been opened~~ when a restroom use event is not followed by a sink use event and for performing a pre-defined action if it is determined that ~~said door has been opened~~ the restroom use event is not followed by a sink use event, wherein said processor is configured to determine whether ~~said door has been opened~~ the restroom use event is not followed by a sink use event by performing a process comprising:
(a) using said image processing code to identify an object in said digital image frame, (b) using the object-to-event mapping table to determine the particular object to which the ~~door~~ open-sink use event is mapped, and (c) determining whether the identified object matches the particular object to which the ~~door-open-sink use~~ event is mapped.

2. (Previously Presented) The device of claim 1, wherein said memory comprises a circular frame buffer.

3. (Previously Presented) The device of claim 1, wherein said digital image frame is discarded after said processor uses said image processing code to identify the objects in said digital image frame.

4. (Original) The device of claim 1, said memory further including an event storage that stores one or more events extracted from one or more digital image frames.

5. Canceled

6. (Previously Presented) The device of claim 1, wherein said image processing code further includes a library of predetermined objects, with each object in said library of predetermined objects representing a predetermined event.

7. (Previously Presented) The device of claim 1, wherein said processor compares said digital image frame to a quiescent frame and detects an event if said digital image frame is substantially different than said quiescent frame.

8. (Currently Amended) ~~An event~~ A restroom monitoring method, comprising the steps of:

positioning a digital image capturing device inside of a restroom having a sink, wherein the image capturing device is positioned such that the field of view of the image capturing device includes the sink;

capturing a first digital image frame using the positioned image capturing device, wherein the first digital image includes a view of the sink;

~~storing information that maps a predefined object to a sink use event;~~

~~identifying an object in said digital image frame; and~~

capturing a second digital image using the positioned image capturing device; and

determining whether a sink use event has occurred by determining whether the identified object matches said predefined object, wherein the step of determining whether a sink use event has occurred includes comparing the second image with the first image.

9. (Currently Amended) The method of claim 8, wherein said second digital image frame is discarded after said determining step.

10. (Original) The method of claim 8, further comprising the step of storing said event.

11. (Currently Amended) The method of claim 8, further comprising ~~performing a subsequent capturing step~~ a third digital image using the image capturing device after waiting a predetermined time period after the first capturing step the second digital image.

12. (Currently Amended) The method of claim 8, ~~wherein said step of further comprising identifying an object in said second digital image frame comprises using an image processing algorithm to detect for detecting one or more objects in said second digital image frame.~~

13. (Currently Amended) The method of claim 8, further comprising storing wherein said information comprises an object-to-event mapping table that maps a predefined object to a sink use event.

14. (Previously Presented) The method of claim 13, wherein said determining step further comprises accessing the object-to-event mapping table.

15. (Currently Amended) The method of claim 8, wherein said determining step further comprises with the step of identifying an object in said second digital image frame further comprising the step of by comparing said object in said second digital image frame to a library of predetermined objects, with each object in said library of predetermined objects representing a predetermined event.

16. (Currently Amended) ~~An event~~ A restroom monitoring method, comprising the steps of:

positioning a digital image capturing device inside of a restroom having a sink,
wherein the image capturing device is positioned such that the field of view of the image
capturing device includes the sink;

using the positioned image capturing device to capture ~~capturing~~ a quiescent frame at
a beginning of an event monitoring session;

capturing a digital image frame using the positioned image capturing device;

comparing said digital image frame to said quiescent frame;

determining if said digital image frame includes an object that is not included in said
quiescent frame; and

if said digital image frame includes an object that is not included in said quiescent
frame, identifying an event by comparing said object with a stored plurality of predefined
objects, wherein said stored plurality of predefined objects includes ~~an object~~ a first object
that represents a door open event ~~or~~ and a second object that represents a sink use event.

17. (Previously Presented) The method of claim 16, wherein said digital image
frame is discarded after said step of identifying an event.

18. (Original) The method of claim 16, further comprising the step of storing said
event.

19. (Currently Amended) The method of claim 16, wherein the steps of capturing a
digital image frame, comparing, and ~~detecting~~ determining are iteratively performed, and
further comprising the step of waiting a predetermined time period after the ~~detecting~~
determining step before performing a subsequent capturing a digital image frame step.

20. Cancelled.